OIPE JC172
NOV 10 2003
PATENT & TRADEMARK OFFICE

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PTO/SB/21 (08-00)
Approved for use through 10/31/2002. OMB 0651-0031
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TRANSMITTAL FORM

(to be used for all correspondence after initial filing)

Application Number	10/686,160
Filing Date	Oct 15, 2003
First Named Inventor	Rui
Group Art Unit	
Examiner Name	
Total Number of Pages in This Submission	
Attorney Docket Number	MS1-1675US

ENCLOSURES *(check all that apply)*

- [✔] Fee Transmittal Form
  - [ ] Fee Attached
- [ ] Amendment / Reply
  - [ ] After Final
  - [ ] Affidavits/declaration(s)
- [ ] Extension of Time Request
- [ ] Express Abandonment Request
- [✔] Information Disclosure Statement
- [ ] Certified Copy of Priority Document(s)
- [ ] Response to Missing Parts/ Incomplete Application
  - [ ] Response to Missing Parts under 37 CFR 1.52 or 1.53
- [ ] Assignment Papers *(for an Application)*
- [ ] Drawing(s) Sheets
- [ ] Licensing-related Papers
- [ ] Petition
- [ ] Petition to Convert to a Provisional Application
- [ ] Power of Attorney, Revocation Change of Correspondence Address
- [ ] Terminal Disclaimer
- [ ] Request for Refund
- [ ] CD, Number of CD(s) _____
- [ ] After Allowance Communication to Group
- [ ] Appeal Communication to Board of Appeals and Interferences
- [ ] Appeal Communication to Group *(Appeal Notice, Brief, Reply Brief)*
- [ ] Proprietary Information
- [ ] Status Letter
- [✔] Other Enclosure(s) *(please identify below)*:

Return Receipt Postcard

Remarks

SIGNATURE OF APPLICANT, ATTORNEY, OR AGENT

Firm *or* Individual name	Lawrence E. Lycke
Signature	Lawrence E. Lycke
Date	Nov. 7, 2003

CERTIFICATE OF MAILING

I hereby certify that this correspondence is being deposited with the United States Postal Service with sufficient postage as first class mail in an envelope addressed to: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 on this date: 11/7/03

Typed or printed name	Wendy Saxby		
Signature	Wendy Saxby	Date	11/7/03

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OIPE JC173
NOV 10 2003
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PTO/SB/17 (10-03)
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FEE TRANSMITTAL for FY 2004

Effective 10/01/2003. Patent fees are subject to annual revision.

☐ Applicant claims small entity status. See 37 CFR 1.27

TOTAL AMOUNT OF PAYMENT ($) 0

Complet if Known	
Application Number	10/686,160
Filing Date	Oct 15, 2003
First Named Inventor	Rui
Examiner Name	
Art Unit	
Attorney Docket No.	MS1-1675US

METHOD OF PAYMENT *(check all that apply)*

☐ Check ☐ Credit card ☐ Money Order ☐ Other ☐ None

☑ Deposit Account:

Deposit Account Number: 12-0769

Deposit Account Name: Lee & Hayes, PLLC

The Director is authorized to: *(check all that apply)*

☑ Charge fee(s) indicated below ☑ Credit any overpayments

☑ Charge any additional fee(s) or any underpayment of fee(s)

☐ Charge fee(s) indicated below, **except for the filing fee** to the above-identified deposit account.

FEE CALCULATION

1. BASIC FILING FEE

Large Entity Fee Code	Large Entity Fee ($)	Small Entity Fee Code	Small Entity Fee ($)	Fee Description	Fee Paid
1001	770	2001	385	Utility filing fee	
1002	340	2002	170	Design filing fee	
1003	530	2003	265	Plant filing fee	
1004	770	2004	385	Reissue filing fee	
1005	160	2005	80	Provisional filing fee	

SUBTOTAL (1) ($)

2. EXTRA CLAIM FEES FOR UTILITY AND REISSUE

		Extra Claims		Fee from below	Fee Paid
Total Claims		-20** =		X	=
Independent Claims		- 3** =		X	=
Multiple Dependent					=

Large Entity Fee Code	Large Entity Fee ($)	Small Entity Fee Code	Small Entity Fee ($)	Fee Description
1202	18	2202	9	Claims in excess of 20
1201	86	2201	43	Independent claims in excess of 3
1203	290	2203	145	Multiple dependent claim, if not paid
1204	86	2204	43	** Reissue independent claims over original patent
1205	18	2205	9	** Reissue claims in excess of 20 and over original patent

SUBTOTAL (2) ($)

**or number previously paid, if greater; For Reissues, see above

FEE CALCULATION (continued)

3. ADDITIONAL FEES

Large Entity Fee Code	Large Entity Fee ($)	Small Entity Fee Code	Small Entity Fee ($)	Fee Description	Fee Paid
1051	130	2051	65	Surcharge - late filing fee or oath	
1052	50	2052	25	Surcharge - late provisional filing fee or cover sheet	
1053	130	1053	130	Non-English specification	
1812	2,520	1812	2,520	For filing a request for *ex parte* reexamination	
1804	920*	1804	920*	Requesting publication of SIR prior to Examiner action	
1805	1,840*	1805	1,840*	Requesting publication of SIR after Examiner action	
1251	110	2251	55	Extension for reply within first month	
1252	420	2252	210	Extension for reply within second month	
1253	950	2253	475	Extension for reply within third month	
1254	1,480	2254	740	Extension for reply within fourth month	
1255	2,010	2255	1,005	Extension for reply within fifth month	
1401	330	2401	165	Notice of Appeal	
1402	330	2402	165	Filing a brief in support of an appeal	
1403	290	2403	145	Request for oral hearing	
1451	1,510	1451	1,510	Petition to institute a public use proceeding	
1452	110	2452	55	Petition to revive - unavoidable	
1453	1,330	2453	665	Petition to revive - unintentional	
1501	1,330	2501	665	Utility issue fee (or reissue)	
1502	480	2502	240	Design issue fee	
1503	640	2503	320	Plant issue fee	
1460	130	1460	130	Petitions to the Commissioner	
1807	50	1807	50	Processing fee under 37 CFR 1.17(q)	
1806	180	1806	180	Submission of Information Disclosure Stmt	
8021	40	8021	40	Recording each patent assignment per property (times number of properties)	
1809	770	2809	385	Filing a submission after final rejection (37 CFR 1.129(a))	
1810	770	2810	385	For each additional invention to be examined (37 CFR 1.129(b))	
1801	770	2801	385	Request for Continued Examination (RCE)	
1802	900	1802	900	Request for expedited examination of a design application	

Other fee (specify) _____

*Reduced by Basic Filing Fee Paid

SUBTOTAL (3) ($)

SUBMITTED BY

(Complete *(if applicable)*)

Name (Print/Type)	Lawrence E. Lycke	Registration No. (Attorney/Agent)	38540	Telephone	509-324-9256
Signature				Date	Nov. 7, 2003

WARNING: Information on this form may become public. Credit card information should not be included on this form. Provide credit card information and authorization on PTO-2038.

This collection of information is required by 37 CFR 1.17 and 1.27. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 12 minutes to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS.
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OIPE JC173 NOV 10 2003 PATENT & TRADEMARK OFFICE

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Serial No. 10/686,160
Filing Date ..... Oct 15, 2003
Inventorship ..... Rui et al.
Applicant ..... Microsoft Corporation
Attorney's Docket No. MS1-1675US
Title: Methods and Systems for Estimating Network Available Bandwidth Using Packet Pairs and Spatial Filtering

INFORMATION DISCLOSURE STATEMENT

References -- See Attached Form PTO-1449

REMARKS

The citations listed, copies of articles attached, are submitted in compliance with the duty of disclosure defined in 37 CFR §1.56. The Examiner is requested to make these citations of official record in this application.

Respectfully Submitted,

Date: Nov. 7, 2003

By: _____
Lawrence E. Lycke
Reg. No. 38540

OIPE JC17
NOV 10 2003
PATENT & TRADEMARK OFFICE

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Substitute for form 1449A/PTO

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(use as many sheets as necessary)

Sheet 1 of 2

Complete if Known	
Application Number	10/686,160
Filing Date	Oct 15, 2003
First Named Inventor	Rui
Group Art Unit	
Examiner Name	
Attorney Docket Number	MS1-1675US

U.S. PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	U.S. Patent Document Number	Kind Code[2] (if known)	Name of Patentee or Applicant of Cited Document	Date of Publication of Cited Document MM-DD-YYYY	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		5,359,593		Derby et al.	10-25-1994	
		5,815,492		Berthaud et al.	09-29-1998	
		5,881,050		Chevalier et al.	03-09-1999	
		5,884,037		Aras et al.	03-16-1999	
		5,949,758		Kober	09-07-1999	
		6,011,776		Berthaud et al.	01-04-2000	
		6,011,804		Bertin et al.	01-04-2000	
		6,233,017B1		Chaddha	05-15-2001	
		6,262,974B1		Chevalier et al.	07-17-2001	
		6,337,881B1		Chaddha	01-08-2002	
		6,392,705B1		Chaddha	05-21-2002	
		6,564,262B1		Chaddha	05-13-2003	
		6,563,517		Bhagwat et al.	05-13-2003	
		6,596,341		Gui et al.	07-22-2003	

FOREIGN PATENT DOCUMENTS

Examiner Initials*	Cite No.[1]	Foreign Patent Document Office[3]	Number[4]	Kind Code[5] (if known)	Name of Patentee or Applicant of Cited Document	Date of Publication of Cited Document MM-DD-YYYY	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear	T[6]

Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

[1] Unique citation designation number. [2] See attached Kinds of U.S. Patent Documents. [3] Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). [4] For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. [5] Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST. 16 if possible. [6] Applicant is to place a check mark here if English language Translation is attached.

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OIPE JC12 NOV 10 2003 PATENT & TRADEMARK OFFICE

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Substitute for form 1449B/PTO

INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(use as many sheets as necessary)

Sheet 2 of 2

Complet if Known	
Application Number	10/686,160
Filing Date	Oct 15, 2003
First Named Inventor	Rui
Group Art Unit	
Examiner Name	
Attorney Docket Number	MS1-1675US

NON PATENT LITERATURE DOCUMENTS

Examiner Initials*	Cite No.[1]	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T[2]
		S. Towers; "Kernel Proability Density Estimation Methods"; Advanced Statistical Techniques in Particle Physics; www.ippp.dur.ac.uk/statistics/papers/towers_pde.ps.gz; pp. 107-111; March 2002.	
		R. S. Prasad, M. Murray, C. Dovrolis and K. Claffy; "Bandwidth estimation: metrics, measurement, techniques, and tools"; IEEE Network; SciDac program of the US Department of Energy; www.cc.gatech.edu/fac/constantinos.dovrolis/papers/netdovd248.pdf; pp. 1-12; June 2003.	
		Tatiana B. Pereira and Lee L. Ling; "Network Performance Analysis of an Adaptive OSPF Routing Strategy-Effective Bandwidth Estimation"; IEEE International Telecommunication Symposium-ITS; September 2002.	
		Kazumine Matoba, Shingo Ata and Masayuki Murata; "Improving Bandwidth Estimation for Internet Links by Statistical Methods"; IEICE Trans. on Communications; Vol. E00-13; No. 6; June 2001.	

Examiner Signature		Date Considered	

*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

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